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U.S. PATENT & TRADEMARK OFFICE

Patent  
Attorney's Docket No. 018656-045

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Patent Application of )  
Hiroyuki OKADA ) Group Art Unit: 2612  
Application No.: 09/205,094 ) Examiner: John M. Villecco  
Filed: December 3, 1998 ) Confirmation No.: 8215  
For: DIGITAL CAMERA )  
)  
)  
)  
)  
)

SUBMISSION OF FORMAL DRAWINGS

Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

Sir:

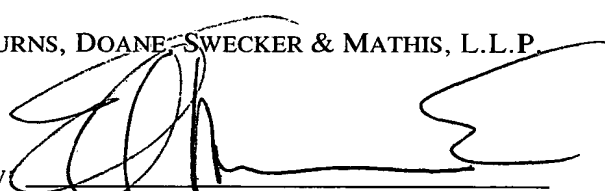
Enclosed please find twelve sheet(s) of formal drawings for review by the Patent and Trademark Office. Should the enclosed drawing(s) require changes, it is respectfully requested that the Patent and Trademark Office notify the undersigned of same.

Respectfully submitted,

BURNS, DOANE, SWECKER & MATHIS, L.L.P.

Date: November 13, 2003

By

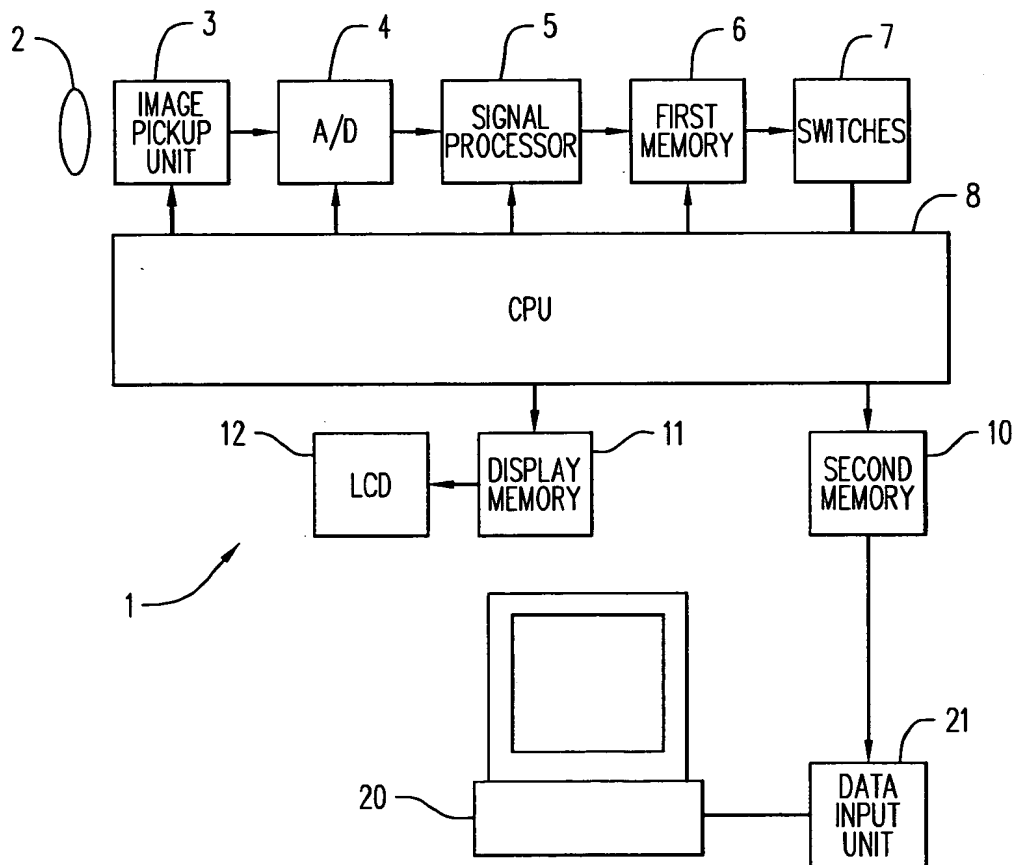
  
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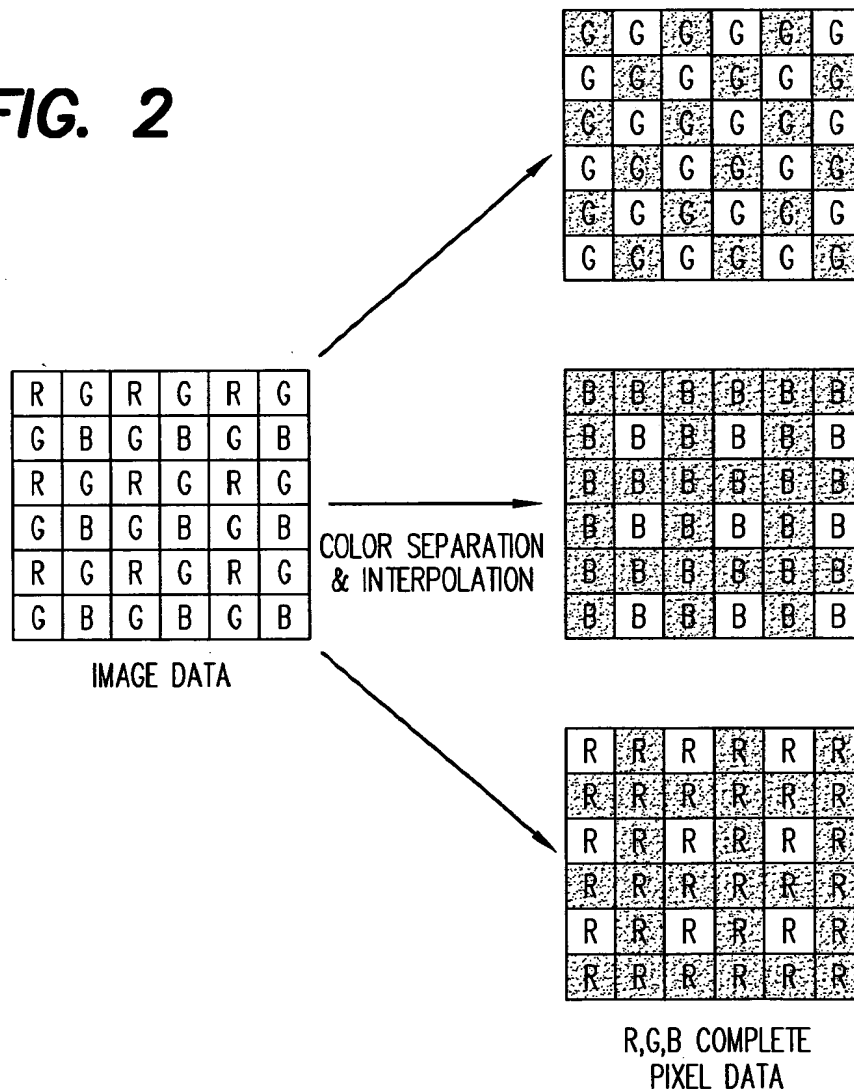


**FIG. 1**





**FIG. 2**





**FIG. 3**

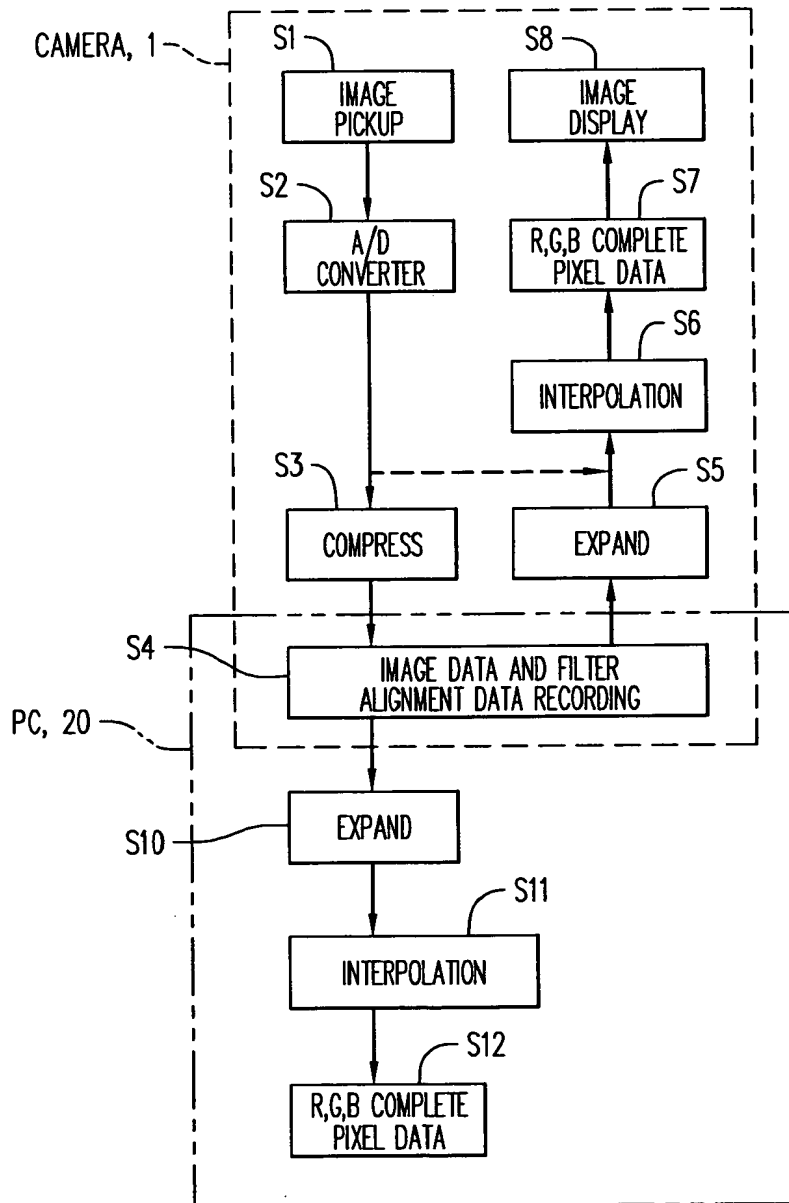


Diagram illustrating the image data processing flow:

- IMAGE DATA** (Input: 6x6 grid of ?)
- RECORDING** (Process: IMAGE DATA FILE)
- AND FILTER ALIGNMENT DATA** (Output: 6x6 grid of ?)
- EXPAND** (Process: EXPAND)
- COLOR SEPARATION AND INTERPOLATION** (Process: COLOR SEPARATION AND INTERPOLATION)
- R, G, B COMPLETE PIXEL DATA** (Output: 6x6 grid of G, B, R values)



**FIG. 5a**

R	G	R	G	R	G
G	B	G	B	G	B
R	G	R	G	R	G
G	B	G	B	G	B
R	G	R	G	R	G
G	B	G	B	G	B

TYPE - 1

**FIG. 5b**

B	G	B	G	B	G
G	R	G	R	G	R
B	G	B	G	B	G
G	R	G	R	G	R
B	G	B	G	B	G
G	R	G	R	G	R

TYPE - 2

**FIG. 5c**

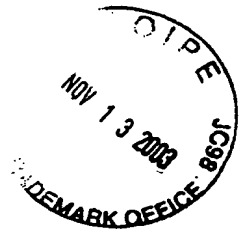
G	R	G	R	G	R
B	G	B	G	B	G
G	R	G	R	G	R
B	G	B	G	B	G
G	R	G	R	G	R
B	G	B	G	B	G

TYPE - 3

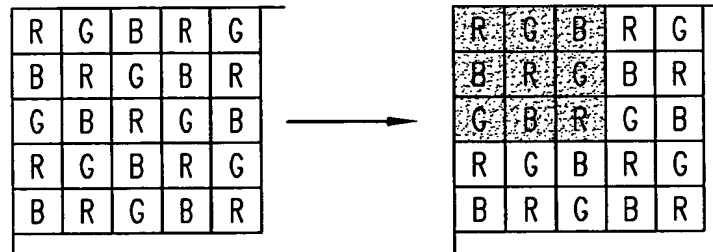
**FIG. 5d**

G	B	G	B	G	B
R	G	R	G	R	G
G	B	G	B	G	B
R	G	R	G	R	G
G	B	G	B	G	B
R	G	R	G	R	G

TYPE - 4



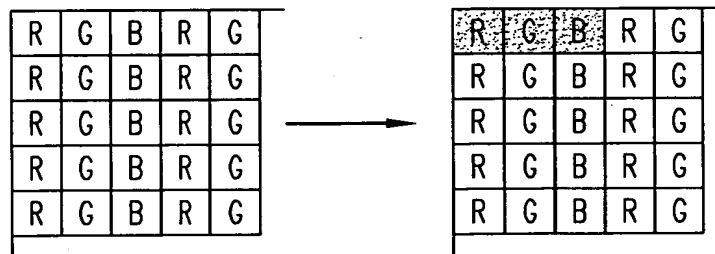
**FIG. 6a**



FILTER ALIGNMENT DATA

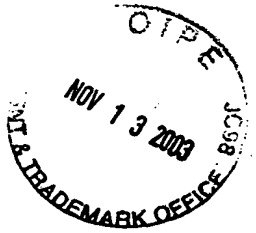
X = 3  
 Y = 3  
 0, 1, 2, 2, 0, 1, 1, 2, 0

**FIG. 6b**



FILTER ALIGNMENT DATA

X = 3  
 Y = 1  
 0, 1, 2



**FIG. 7**

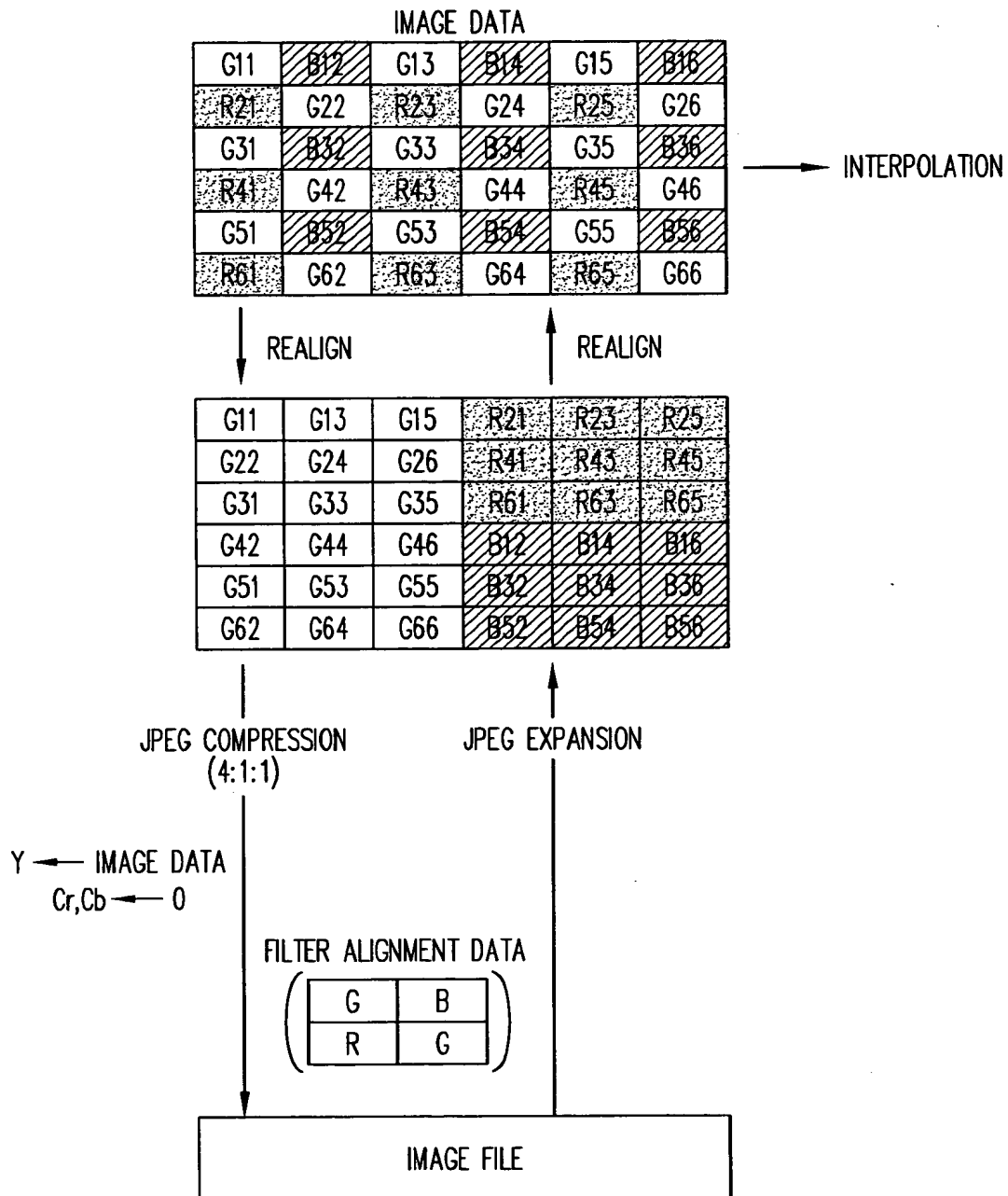






FIG. 8

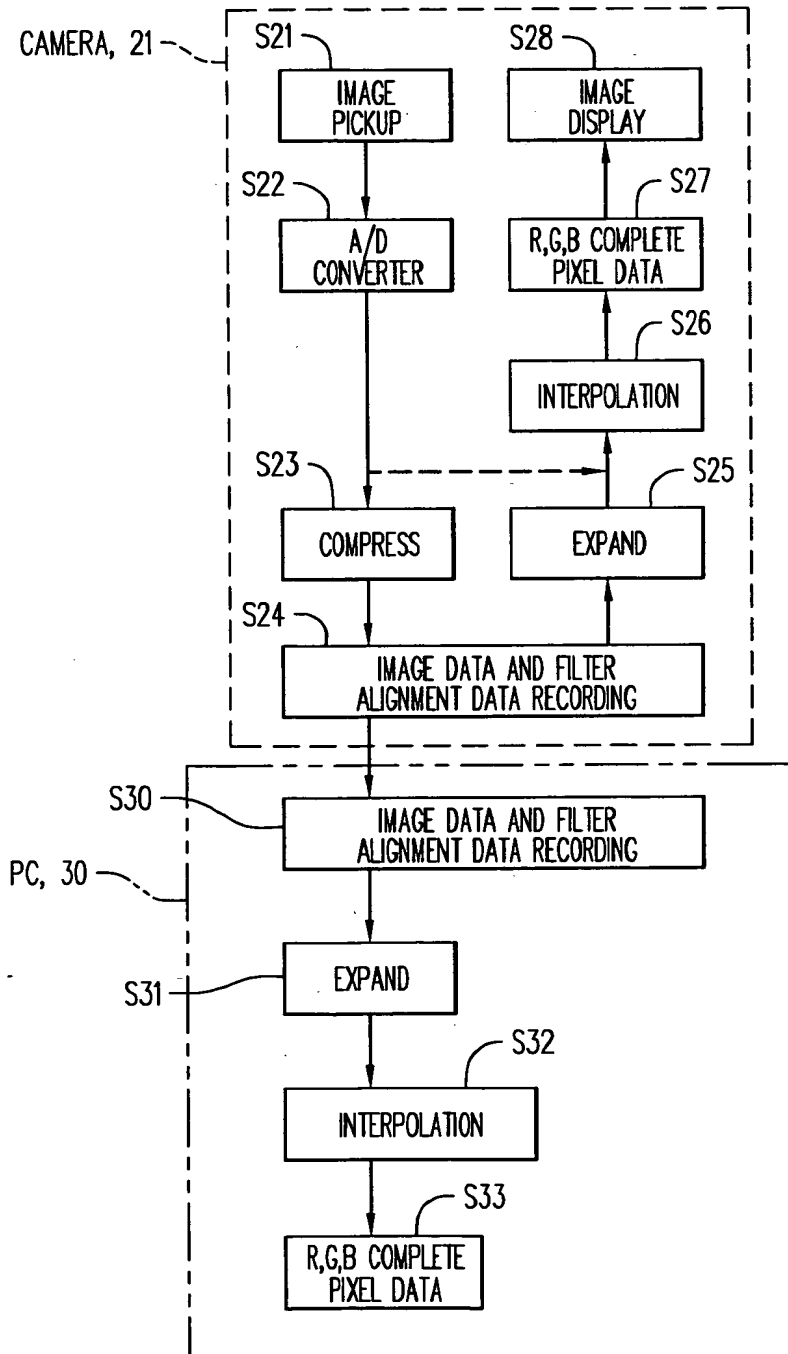
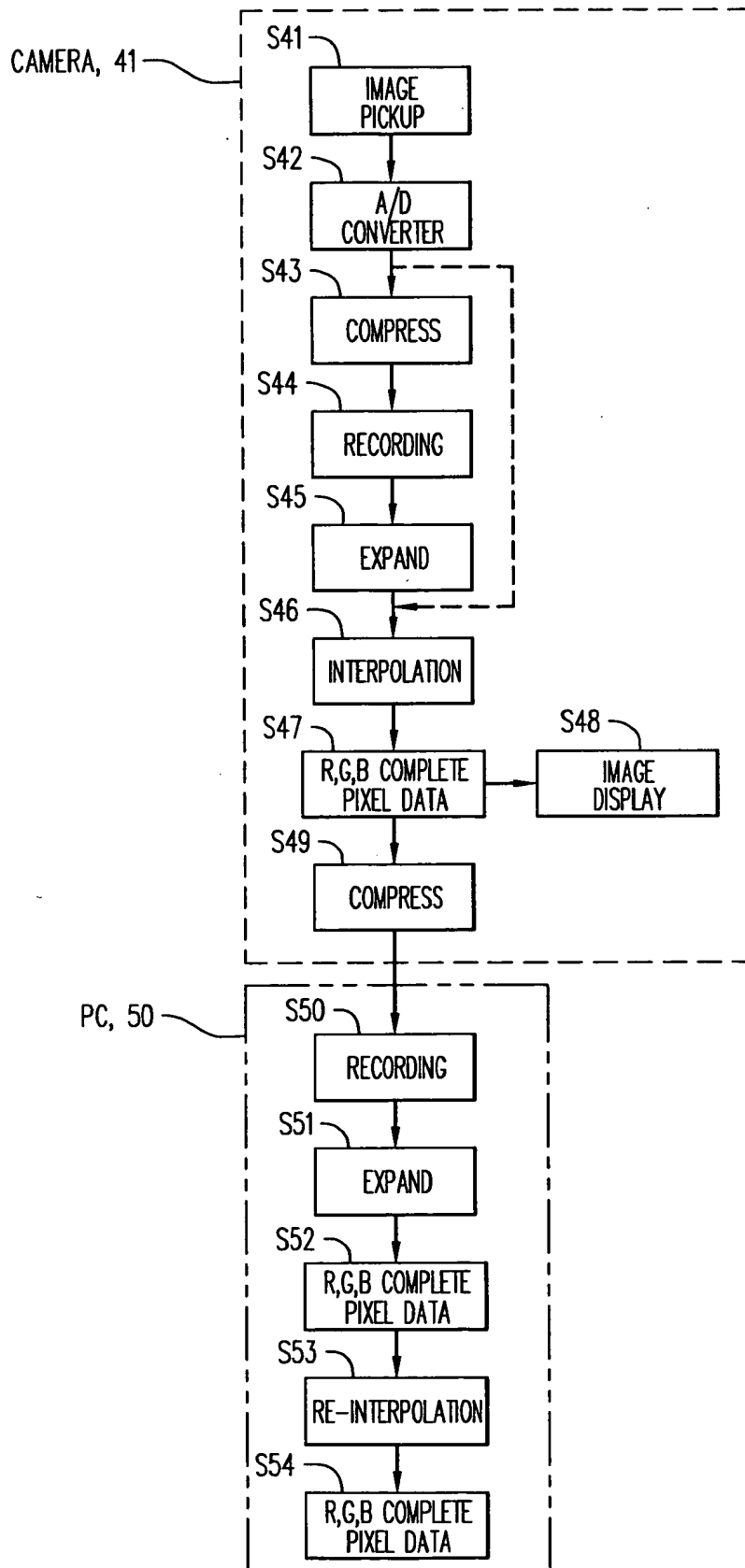


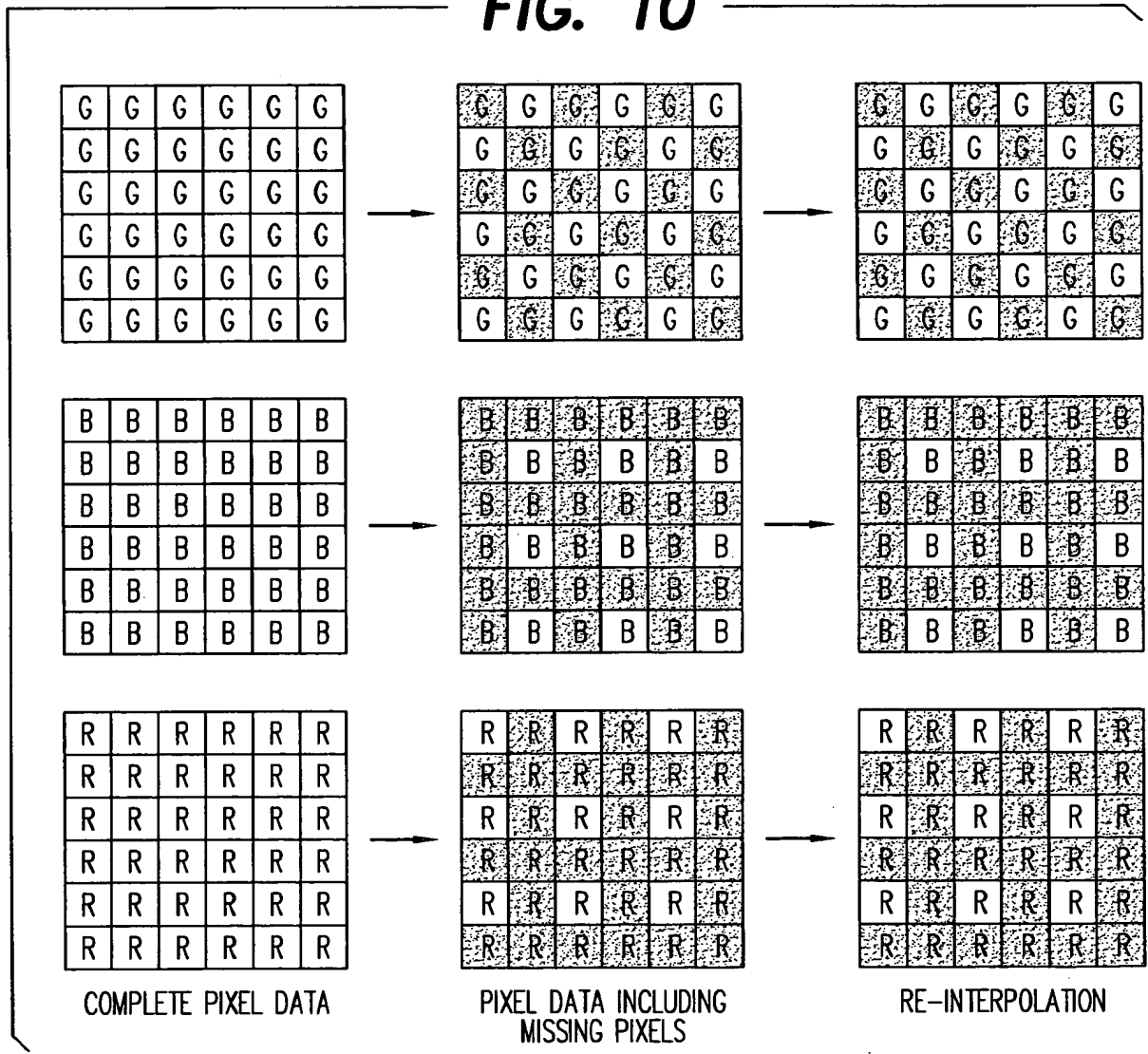


FIG. 9



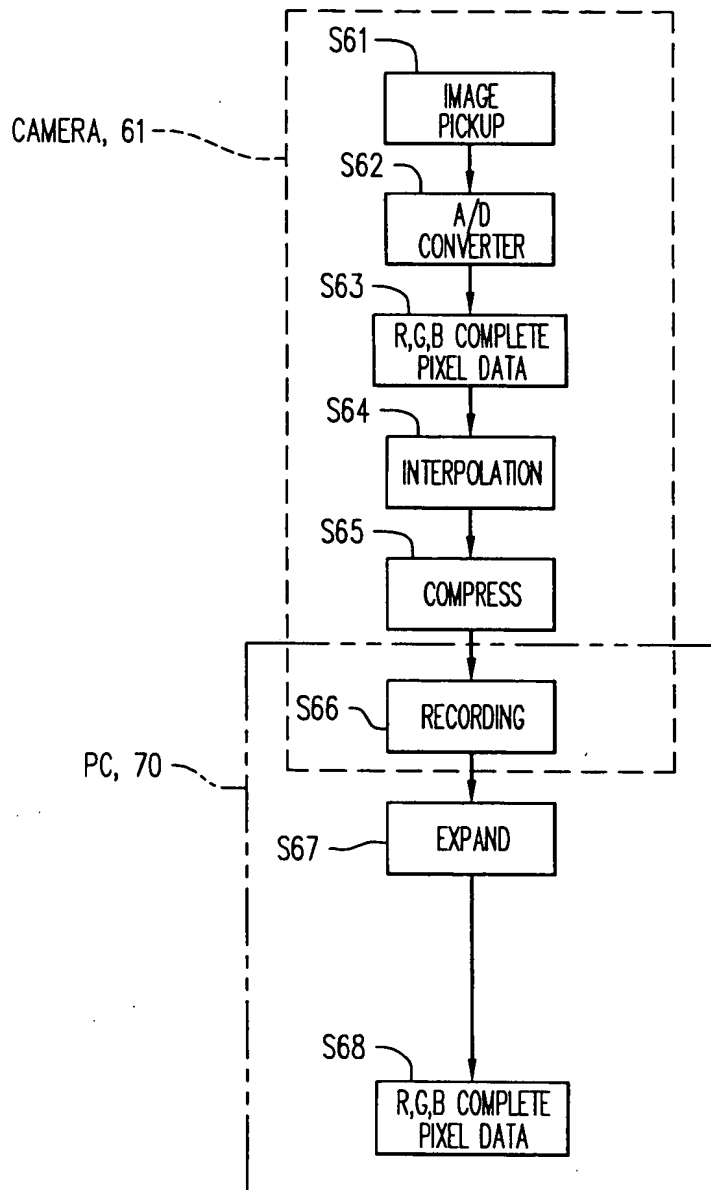


**FIG. 10**





**FIG. 11** PRIOR ART





**FIG. 12** PRIOR ART

